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a particle motion computing unit which generates the adsorbate particles in accordance with the information set by the kinetic condition setting unit and computes motion of the generated adsorbate particles, to simulate phenomena of said particle formed of adsorbate particles and substrate particles, each adsorbate particle having a corresponding emission source wherein

for each adsorbate particle, the kinetic condition setting unit sets a region indicating a position of the corresponding emission source, and

the particle motion computing unit generates each adsorbate particle in accordance with the position of the corresponding emission source.

16. (AS FIVE TIMES AMENDED) An apparatus for simulating phenomena of a particle formed of adsorbate particles and substrate particles, each adsorbate particle having a corresponding emission source, the apparatus comprising:

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a kinetic condition setting unit which sets information for defining kinetic conditions of the adsorbate particles wherein the information can include a position of a corresponding emission source, a temperature, a chemical composition of the particle, a region, a physical condition, a velocity of each atom forming the particle, and a direction; and

a particle motion computing unit which generates the adsorbate particles in accordance with the information set by the kinetic condition setting unit and the position of the corresponding emission source, and computes motion of the generated adsorbate particles, to simulate phenomena of said particle formed of adsorbate particles and substrate particles, each adsorbate particle having a corresponding emission source.

20. (AS FIVE TIMES AMENDED) A computer-implemented method for simulating phenomena of a particle formed of adsorbate particles and substrate particles, each adsorbate particle having a corresponding emission source, the method comprising the steps of:

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setting information for defining a plurality of generation periods and a corresponding number of adsorbate particles to be generated during each generation period wherein the information can include a position of a corresponding emission source, a temperature, a chemical composition of the particle, a region, a physical condition, a velocity of each atom forming the particle, and a direction;

generating the adsorbate particles in accordance with the information set in the setting step and the position of the corresponding emission sources;

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computing motion of the generated adsorbate particles; and
simulating phenomena of said particle formed of adsorbate particles and substrate
particles in accordance with the computed motion.

23. (AS FIVE TIMES AMENDED) A method for simulating phenomena of a particle
formed of adsorbate particles and substrate particles, each adsorbate particle having a
corresponding emission source, the method comprising:

setting information for defining kinetic conditions of the adsorbate particles wherein the
information can include a position of a corresponding emission source, a temperature, a
chemical composition of the particle, a region, a physical condition, a velocity of each atom
forming the particle, and a direction;

displaying the set information;

generating the adsorbate particles in accordance with the set information and the
positions of the corresponding emission sources; and

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computing motion of the generated adsorbate particles, to simulate phenomena of said
particle formed of adsorbate particles and substrate particles, each adsorbate particle having a
corresponding emission source.

24. (AS FIVE TIMES AMENDED) An apparatus for simulating phenomena of a
particle formed with adsorbate particles, comprising:

a kinetic condition setting unit which sets information for defining kinetic conditions of the
adsorbate particles wherein the information can include a position of a corresponding emission
source, a temperature, a chemical composition of the particle, a region, a physical condition, a
velocity of each atom forming the particle, and a direction; and

a particle motion computing unit which generates the adsorbate particles in accordance
with the information set by the kinetic condition setting unit and computes motion of the
generated adsorbate particles, to simulate phenomena of said particle formed with adsorbate
particles, each adsorbate particle having a corresponding emission source, wherein

for each adsorbate particle, the kinetic condition setting unit sets a region
indicating a position of the corresponding emission source, and

the particle motion computing unit generates each adsorbate particle in
accordance with the position of the corresponding emission source as indicated by the region
set by the kinetic condition setting unit.
